

FIGURE 1. RENILLA RENIFORMIS POLYNUCLEOTIDE
SEQUENCE (SEQ ID NO.1)

R. ren: 1 ATGGTGAGTAAACAAATATTGAAGAACACTGGATTGCAGGAGATCATGTCGTTTAAAGTGAATC 64

R. ren: 65 TGGAAGGTGTAGTAAACAATCATGTGTTACAATGGAAGGTTGTGGAAAAGGAAATATTT 124

R. ren: 125 TATTCGGAACCAACTGGTTCAGATTCGTGTCACAAAAGGGGCTCCGCTTCCATTTGCAT 184

R. ren: 185 TTGATATTCTCTCACCAGCTTTCCAATACGGCAACCGTACATTCACGAAATACCCGGAGG 244

R. ren: 245 ATATATCAGACTTTTTTATACAATCATTTCCAGCGGGATTGTGTATACGAAAGAACGTTGC 304

R. ren: 305 GTTACGAAGATGGTGGACTGGTTGAAATCCGTTAGATATAAAATTTAATCGAGGAGATGT 364

R. ren: 365 TTGTCTACAGAGTGGAATATAAAGGTAGTAACTTCCCGAATGATGGTCCAGTGATGAAGA 424

R. ren: 425 AGACAATCACAGGATTACAACCTTCGTTGGAAGTTGTGTATATGAACGATGGCGTCTTGG 484

R. ren: 485 TTGGCCAAGTCATTCTTGTTTATAGATTAACTCTGGCAAATTTTATTCGTGTCACATGA 544

R. ren: 545 GAACACTGATGAAATCAAAGGGTGTAGTGAAGGATTTTCCCGAATACCATTTCAATCAAC 604

R. ren: 605 ATCGTTTAGAGAAGACGTATGTGGAAGACGGAGGTTTTGTTGAGCAACACGAGACGGCCA 664

R. ren: 665 TTGCTCAACTGACATCGCTGGGGAAACCACTTGGATCCTTACACGAATGGGTTTAA 720

[illegible]

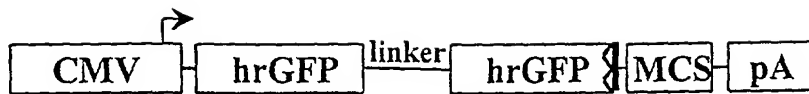
R. reni: 61 FDILSPAFAQYGNRTFTKYPEDISDFFIQSFPAGFVYERTLRYEDGGLVEIRSDINLIEQM 120

R. reni: 182 RTLMKSKGVVKDFPEYHFIQHRLEKTYVEDGGFVEQHETAIAQLTSLGKPLGSLHEWV 238

FIGURE 3. POLYNUCLEOTIDE AND AMINO ACID SEQUENCES OF A
HUMANIZED *R. RENIFORMIS* GFP.
(SEQ ID NOs: 3 and 4, respectively)

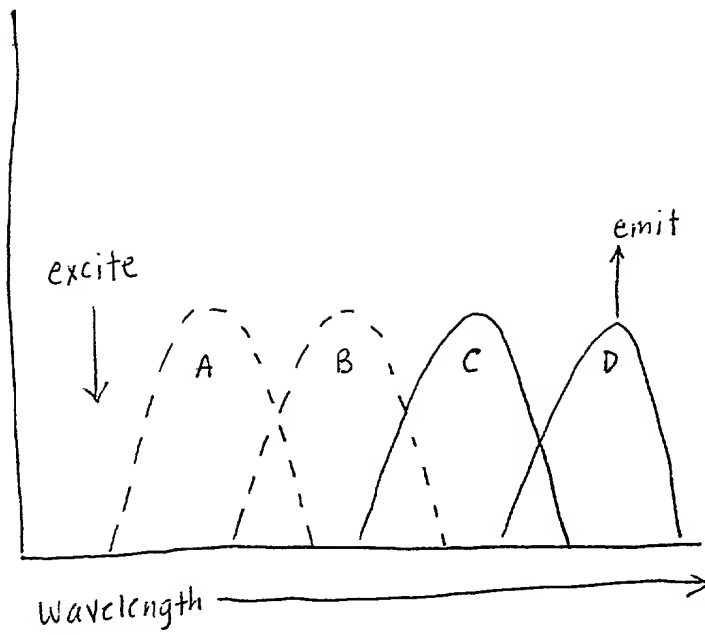
1 ATGGTGAGCAAGCAGATCCTGAAGAACACCGGCCTGCAGGAGATCATGAGCTTCAAGGTG
M V S K Q I L K N T G L Q E I M S F K V
61 AACCTGGAGGGCGTGGTGAACAACCACGTGTTACCATGGAGGGCTGCGGCAAGGGCAAC
N L E G V V N N H V F T M E G C G K G N
121 ATCCTGTTTCGGCAACCAGCTGGTGCAGATCCGCGTGACCAAGGGCGCCCCCTGCCCTTC
I L F G N Q L V Q I R V T K G A P L P F
181 GCCTTCGACATCCTGAGCCCCGCCTTCCAGTACGGCAACCGCACCTTCACCAAGTACCCC
A F D I L S P A F Q Y G N R T F T K Y P
241 GAGGACATCAGCGACTTCTTCATCCAGAGCTTCCCCGCCGGCTTCGTGTACGAGCGCACC
E D I S D F F I Q S F P A G F V Y E R T
301 CTGCGCTACGAGGACGGCGGCCTGGTGGAGATCCGCAGCGACATCAACCTGATCGAGGAG
L R Y E D G G L V E I R S D I N L I E E
361 ATGTTTCGTGTACCGCGTGGAGTACAAGGGCCGCAACTTCCCCAACGACGGCCCCGTGATG
M F V Y R V E Y K G S N F P N D G P V M
421 AAGAAGACCATCACCGGCCTGCAGCCCAGCTTCGAGGTGGTGTACATGAACGACGGCGTG
K K T I T G L Q P S F E V V Y M N D G V
481 CTGGTGGGCCAGGTGATCCTGGTGTACCGCCTGAACAGCGGCAAGTTCTACAGCTGCCAC
L V G Q V I L V Y R L N S G K F Y S C H
544 ATGCGCACCCCTGATGAAGAGCAAGGGCGTGGTGAAGGACTTCCCCGAGTACCACTTCATC
M R T L M K S K G V V K D F P E Y H F I
604 CAGCACCGCCTGGAGAAGACCTACGTGGAGGACGGCGGCTTCGTGGAGCAGCACGAGACC
Q H R L E K T Y V E D G G F V E Q H E T
664 GCCATCGCCCAGCTGACCAGCCTGGGCAAGCCCCTGGGCAGCCTGCACGAGTGGGTGTAA
A I A Q L T S L G K P L G S L H E W V -

Figure 4



- A.** Gly-Gly-Gly-Gly-Ser-Gly-Gly-Gly-Gly-Ser
- B.** Gly-Gly-Gly-Gly-Ser-Gly-Gly-Gly-Gly-Ser- Gly-Gly-Gly-Gly-Ser
- C.** Gly-Gly-Gly-Gly-Ser-Gly-Gly-Gly-Gly-Ser-Gly-Gly-Gly-Gly-Ser-Gly-Gly-Gly-Gly-Ser

10021818-121301



- A = donor excitation peak
- B = donor emission
- C = acceptor excitation
- D = acceptor emission

FIGURE 5